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DYNAMICS OF INTERNAL MIGRATION IN BANGLADESH

by

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ABSTRACT

Inter-regional net migration rates for Bangladesh have been estimated using the available data set from the 1974 and 1981 census reports. A multiple regression model of internal migration in Bangladesh has failed to support the argument that internal migratory flows are determined by high population density. The development of the agrarian social structure of this country is rooted in the historical evolution of the land tenure system. The analysis indicates a tentative support to the argument that the unequal hierarchical relations of people to the land in the country condition the process by which migration takes place.

I. Introduction

Research on internal migration in Bangladesh has been limited either to estimates of migration inferred from changes in age structures or total numbers specific to a locality between the two census periods (e.g., Obaidullah 1967; Haque 1977; Krishnan and Rowe 1978), or to estimates of international migration made by comparing changes in total populations from the national censuses (e.g., Jillani 1962; Khan 1972). Studies have been conducted on spatial change and distribution of various population characteristics including migration (e.g., Khan 1969; Elahi 1972; Hussain 1972; Stoeckel et al. 1972; Huq 1973; Chaudhury and Curlin 1975; Chaudhury 1978; Begum 1979; Elahi and Sultana 1985; Kamaluddin 1985; Skeldon 1985), but none is a general study focusing specifically at national or regional levels, although some are of excellent quality. Very few have linked migration to the traditional agrarian relations of production in the country, which influence people's behaviour in many ways. This might have resulted partly from the limited data set, and partly from the orientation and the purpose of the studies.

Bangladesh is a country of traditional agrarian structure with probably the highest population density in the world. The vast majority of its total population is dependent on agriculture. The technology of production is backward and unchanging with low productivity. The ownership in land in Bangladesh is highly concentrated (Jannuzi and Peach 1980) and the degree of concentration is on the increase. The change in the distribution of landownership is generally attributed to the rapid fragmentation of land into small holdings. The inability of many of the small landholdings to remain viable has led to the increasing number of landless agricultural labourers in the country. The main reason for this is believed to be the high rate of population growth and the limited amount in supply of land (Chaudhury 1981). With this approach, migration researchers have suggested that the high growth rate of population determines the migratory flows in the country significantly by placing excessive pressure on the limited amount of land available for agricultural production (Krishnan and Rowe 1978; Bangladesh Bureau of Statistics 1984; and Elahi and Sultana 1985).

This does not seem to be an adequate explanation of the real situation. Adnan (1982) holds that in a country like Bangladesh, high population growth is a result of the historical development of relations between land and labour. Jannuzi and Peach (1980) demonstrate that the social structure of the country reflects an unequal hierarchical relations of people to the land, which is rooted in the historical evolution of land tenure system of the region. It is a structure that ensures to favour those who have secured rights and privileges in land with the benefits of the structural developmental programmes of the country. According to this approach, these relationships condition the process by which migration of poor/landless peasants to other rural areas or urban centres in search of employment opportunities becomes inevitable (Adnan 1982; and Jannuzi 1988). It is, therefore, important to briefly review the political economy of the land relations in a historical perspective that characterizes the social relations of production, and determines the major portion of the internal migration that takes place in the country.

II. The Political Economy of Land Relations in Bangladesh[1]

During the pre-British period, private ownership of land, in the western sense of the term, was absent in this region of Bangladesh, India and Pakistan. All lands were owned by the State. The king used to appoint intermediaries (e.g., Mansabdars, Jagirdars, and Zamindars)[2] to collect revenue from the farmers. The peasants, however, enjoyed hereditary occupancy rights functionally, if not theoretically, of the lands that belonged to them. But the intermediaries were the privileged groups, and they enjoyed the superior and secured rights in land as far as the control on land was concerned. They had the authority to levy the amount of revenue to be paid by the farmers. Under this relationship, oppression of the peasantry was common. The usual peasant response to the oppression was to flee en masse to other territories (Bernier 1914 [1891]). In some cases, the peasants tried to

[1] The review of the historical development of land relations in the country is heavily drawn upon Abdullah (1976) and Jannuzi and Peach (1980).

[2] The functions, roles and hierarchical status of these functionaries were different in different parts of this region. But they have one thing in common that they were not the proprietors of the lands, rather they were the revenue collectors for the king. See Karim (1980).

organize themselves against the oppressors, but without much success.[3]

After the advent of the British, proprietory rights in land were established through the "Act of Permanent Settlement" in 1793. Ignoring the occupancy rights of the actual tillers of land, the East India Company settled with the Zamindars for a fixed amount of annual rent to be paid to the Company. This gave the Zamindars the sole authority in land and made the actual tillers tenants of the Zamindars. The revenue payable to the British authority by the Zamindars was fixed, but revenue payable by the peasants (tenants) to the Zamindars was not. The Zamindars became the de facto owners of land without performing any agricultural function. They were totally divorced from labour on land or investing in it. For the maintenance of their luxurious style of life, the Zamindars began to demand higher rents and illegal cesses from the tenants. In the event of failure to fulfill the demands, the tenants were oppressed with the ultimate result of either eviction from the land or fleeing to other areas. There had been attempts by the British to intervene by establishing regulations (e.g., the Acts of 1859 and 1885) designed to protect the cultivators from the Zamindars' abuse of power. Such Acts were seldom implemented effectively.

In 1950, three years after the partition of India and Pakistan, East Bengal Legislative Assembly repealed all the previous Acts relating to land system, and passed "The East Bengal State Acquisition Act". This Act seemed to be a landmark legislation in the history of the agrarian relations of the country. The main purposes of this land reform act were to (a) abolish the right of the intermediaries as revenue collecting agents; (b) make the actual cultivators become direct tenants under government; and (c) redistribute the excess land acquired through the imposition of a ceiling of 100 bighas[4] of land per family to the bonafide cultivators holding less than three acres of land. Later the ceiling was extended to 375 bighas per family. This reform did not do much good to the cultivating peasants either. Of course, the rights of the intermediaries as revenue collecting agents

[3] Smith (1944:29-33) pointed out several instances of lower-class uprisings in the Mughal empire in which mainly the poor peasants, and the cultivators who actually had to pay the tax, faught against the tyranny of the landlords, the tax gatherers, or their police.

[4] The measurement of bigha differs from region to region of the country, but the standard 3 bighas equal to 1 acre. 7.47 standard bighas or 2.47 acres equal to 1 hectre.

were abolished, but in fact, they changed their status from the revenue collectors to the land-holding tenants of the State through the "safety-valves" furnished in the Act. The illegal exactions were eliminated in theory, but took new forms[5] in practice. The extent of land redistribution was negligible as a result of the loopholes in the formulation of the provisions, as well as of the subsequent amendments of the Act. The poor and the landless people were extremely unlikely to be the recipients of land, because the redistributed land was not to be given away free (Abdullah 1976:83). The Act of 1950 denied any rights in land for sharecroppers, who eventually became the majority of the real cultivating peasants, and thereby enhanced the prerogatives of the landholding elites in relation to the sharecroppers (Jannuzi and Peach 1980:12).

After the emergence of Bangladesh as an independent nation in 1971, the Government promulgated two Presidential Orders in 1972 to modify the Act of 1950. These ordinances exempted families owning 25 bighas or less of agricultural land from payment of land revenue, and reduced the ceiling on retainable land to 100 bighas per family. The landless and small farmers with less than 1.5 acres of land were promised to be settled with the acquired land. On paper, these Acts seemed favourable to the cultivating peasants, but in practice they were not. The impact of the new laws relating to land system has been again insignificant. The big landholders have retained their lands by providing false returns. The State acquired little amount of land, and consequently, the poor cultivating peasants did not receive any benefit from these laws. In essence, the relations of people to the land have remained relatively unchanged since the nineteenth century despite the enactment of reforms based legislation since the 1947 partition and the independence in 1971. It should be kept in mind that the persons formulated these legislations were almost the same persons who were the landlords or their kith and kin. Therefore, under the existing social relations and power structure, land reforms designed to provide equal rights and privileges to the landlords and the cultivating peasants seem to be unachievable for many years to come.

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[5] The lower government functionaries (the 'tahshildars'), the prototype of the tax collectors ('naibs' and 'gomasthas') of the Zamindars, responsible for tax collection, were not much better than the notorious 'naibs' and 'gomasthas' of the former landlords. They harrassed the farmers in many ways. For accounts, see Abdullah (1976).

To this, the element of population pressure is added. Bangladesh is historically a densely populated area (United Nations 1981), but that density did not put very much pressure on land until all the arable land was subsumed by the labour force. The continued generation of surplus labour force was not matched by the macro level demand in the requirements of agrarian production due to the absence of capitalist development in either agriculture or manufacturing. This situation was primarily created by the colonial metropolitan capital accumulation and the international market relations (Adnan 1982). The generation of surplus labour and the inelastic character of land with the backward technology for cultivation placed pressure on the land, and made it more inaccessible. With superior and secured tenure rights, the landowners tried to extract as much profit as possible. They diverted the agricultural surplus into money lending, speculative trade, and land purchase, because these investments yielded high rates of profit (Jahangir 1979; Rahman1979; Siddiqui 1982).

Emergence of these alternative modes of exploitation shapes the broad material conditions for the structure of the migratory process amongst the rural peasantry. The sharecroppers, the small farmers and the landless labourers compete among themselves to obtain access to the limited amount of land, on the one hand, and the bargaining power of the landowners 'increases their capacity to push the rental rate sufficiently high driving the share of the labourers below the level of subsistence requirements' (Adnan 1982:214), on the other. To make up the subsistence requirements, the cultivating peasants have to mortgage their land/the crop to the landowner/moneylenders. They eventually lose the land/the crop as they cannot repay the debt. The alternate recourse left after that is to migrate sectorally into non-agrarian activities like petty trade, extracting from ecological reserves, and petty services. But the return of this tertiary sector of the economy is so low that they are forced to move out spatially to areas where the rental rates are less exorbitant and work available. With this general background of the country in mind, this study aims at (i) estimating the patterns of inter-regional migration for the census period of 1974-1981; (ii) delineating the trends of levels and patterns over time; and (iii) attempting a regression representation to see the effects of some selected determinants of internal migration in Bangladesh.

III. Data and Methodology

The data sources for this study are the available[6] 1974 and 1981 population census reports. While 1974 census included questions on place of birth and residence and duration of residence, 1981 census did not. This left the option of indirect estimation of internal migration in Bangladesh for the period under study. Following the United Nations' Manual on Methods of Measuring Internal Migration (1970), the census survival ratio method is used for the estimation. The census figures are taken as they are furnished by the census reports. The intercensal period is seven years instead of ten years. Corrections for this unusual intercensal period are made by interpolating the given age groups through the use of the Sprague Multipliers (United Nations 1956:68). In the absence of required data in the 1974 census report, an age-gender specific distribution of population for each district is created using the national proportions, assuming that the difference between the national and the district level age-gender specific proportions do not vary too much. A support for this assumption can be found in the districtwise age-gender specific distribution of population for 1981 (Bangladesh Bureau of Statistics 1984:54-56).

Because census data provide only retrospective information on migration for those alive at the date of observation (Kosinski 1975:108), and persons below 15 years are generally dependent on parents and live with the family, the estimates of net migration for each district are calculated for population 17 years and over who lived in 1981 over the population 10 years and over in 1974. The selection of 17 years instead of 15 years as the cut off point is made because of the correction through interpolation for seven-year duration of the intercensal period of 1974-1981. Rates are calculated using the appropriate 1981 population in the denominator. The interpretation of the rates would be in terms of population who lived in 1981 in a given age group from the preceding age group of 1974 population. In this case, persons of 17 years and over in 1981 from persons of 10 years and over in 1974.

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[6] The national volumes of the census reports containing detailed information are not available here. The reports that are available contain some selected national tables.

The ordinary least squares regression technique is used for the analysis of the effects of the determinants of internal migration. The variables are entered into the regression equation in a pre-determined order.[7] The selection of the operational measures pertaining to the variables that are used in the regression model is dictated by the available data. The data are from the 1974 census, assuming that migration took place as a reaction to the situation at the beginning of the study period. However, in case of unavailability of data for certain measures from the 1974 census, 1981 census figures are used as proxy.

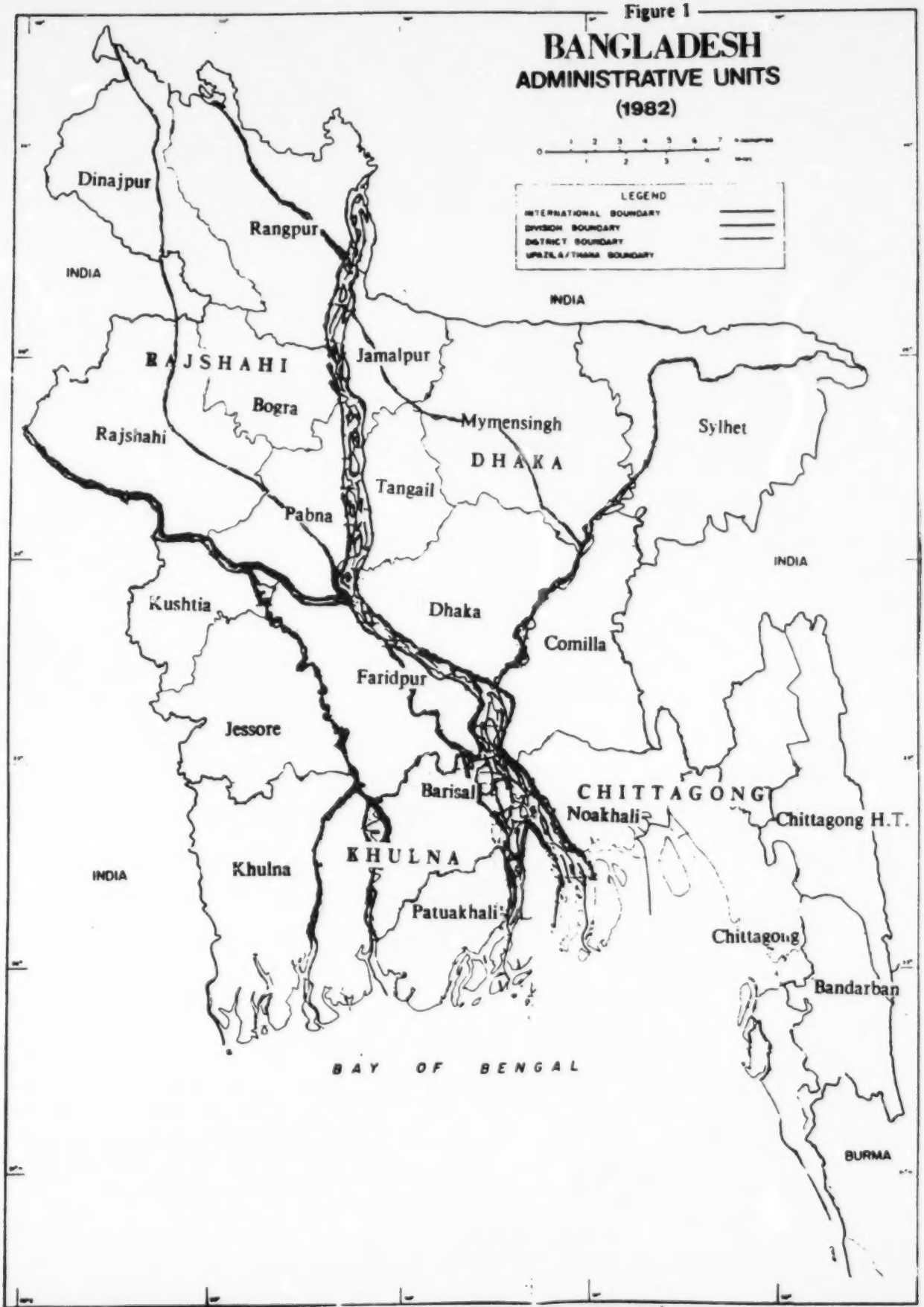
Bangladesh consists of 21 d tricts according to the 1981 census. A map of these districts is shown in Figure 1. The population in these districts ranges from 0.2 million to more than 10 million. The extreme cases in both end of the scale are Dhaka, Chittagong Hill Tracts and Bandarban. Dhaka district has a population of more than 10 million, because it contains the largest city of the country with a population of some 4 million. Chittagong Hill Tracts has only a population of about 0.6 million because of its geographical characteristics. Bandarban is a newly created district with a population of about 0.2 million. These 21 districts are the units of analysis in this study.

IV. Patterns of Internal Migration 1974-1981

On the basis of geographical and administrative set-up, Bangladesh is broadly divided into four major regions: Dhaka, Chittagong, Khulna, and Rajshahi divisions. These are also designated as Central, Eastern, Southern, and Northern regions respectively (United Nations 1981:30). Based on these divisions or regions, a broad regional pattern of net migration in the country can be seen. But from these broad regional patterns, a detailed explanation cannot be made. The focus should be on the smaller regions, i.e., the districts.

[7] This may imply a causal structure among the independent variables, but in our analysis we have not formulated any causal model which is beyond the scope of this study. The total variance explained in the dependent variable remains the same regardless of the order, although the proportion of the variance explained by each independent variable varies with respect to changing the order (Kerlinger and Pedhazur 1973:94). However, the order of the variables in entering the equation was done on the basis of knowledge gained from the experience and from the literature review.

Figure 1



Source: Adapted from Statistics 1984 (River boundaries are not authorative).

The inter-regional (i.e., inter-district) net migration rates in Bangladesh, for the period of 1974-1981, are presented in Table 1. It shows that seven out of 21 districts have gained more people than lost. Three of these net gaining districts (Rajshahi, Bogra, Dinajpur) are from the northern, three (Chittagong, Chittagong Hill Tracts, Bandarban) from the eastern, and only one (Dhaka) from the central region. The highest net gainer, in terms of rate, is Chittagong Hill Tracts (11.9%), followed by Bandarban (11.2%), and Dhaka (4.9%). The lowest net gainer is Dinajpur (1%). Among the net losers, Noakhali has the highest negative rate of balance (3.8%), followed by Faridpur (2.7%), Comilla (2.5%), and Barisal (2.4%). Khulna has the negligible net migration. All districts of the southern, all but one (Dhaka) of the central, three (Noakhali, Comilla and Sylhet) of the eastern, and two (Rangpur, Pabna) of the northern region experienced net migratory loss of population.

Although Chittagong Hill Tracts, Bandarban, and Chittagong having the top, the second, and the fourth highest net rates respectively in population gain, the eastern region as a whole is a net loser. This is because of the fact that the other three districts (Noakhali, Comilla and Sylhet) in this region have experienced more net loss in absolute amount which offset the gain. On the other hand, despite all districts except Dhaka having net losing rate, the central region shows a net population gain. For this net gain in this region, all credit goes to Dhaka, because it contains the capital city of the country (the largest city that contained about 4 million people in 1981).

From the above, it can be said that during the 1974-1981 period, the migratory flows were toward far north, centre, and south-eastern regions. Although it is difficult to determine, statements can be made on the features of the migratory flows that have appeared from the findings. First, people moved toward the rural areas of those districts in which the cultivating peasants are less pressured, and employment opportunities available in the agricultural occupations. The net gains of the far northern region may account for this. Secondly, people moved toward urban areas. This is supported by the fact that among the four major city containing districts (Dhaka, Chittagong, Khulna, and Rajshahi), three experienced net gain. Khulna's net loss is negligible. Thirdly, people

TABLE 1. CENSUS SURVIVAL ESTIMATES OF NET MIGRATION BY DISTRICTS, BANGLADESH 1974-1981

Districts	Net Migrants 1974-1981			Rate per 100 of 1981 Population		
	Both Sexes	Male	Female	Both Sexes	Male	Female
Dinajpur	33,014	20,361	15,022	1.0	1.2	1.0
Rangpur	-22,727	-28,716	3,258	-0.3	-0.9	0.1
Bogra	42,857	25,880	14,250	1.6	1.9	1.1
Rajshahi	105,447	82,214	23,574	2.0	3.0	0.9
Pabna	-21,125	-14,277	-4,532	-0.7	-0.9	-0.9
Kushtia	-39,598	-16,090	23,688	-1.7	-1.4	-2.1
Jessore	-57,099	-20,049	-42,168	-1.4	-1.0	-2.2
Khulna	-1,636	18,214	24,626	-0.0[1]	0.8	-1.2
Patuakhali	-12,132	-6,129	-7,601	-0.7	-0.7	-0.8
Barisal	-110,787	-53,456	-57,377	-2.4	-2.2	-2.5
Faridpur	-129,714	-83,939	-37,268	-2.7	-3.5	-1.6
Dhaka	493,264	360,023	142,345	4.9	6.7	3.1
Tangail	-48,424	-38,566	-12,143	-2.0	-3.1	-1.0
Mymensingh	-45,009	-102,270	2,914	-0.7	-3.0	0.1
Jamalpur	-7,383	-20,272	11,701	-0.3	-1.6	1.0
Sylhet	-70,795	-35,708	-27,242	-1.3	-1.6	-1.0
Comilla	-173,456	-151,107	-15,445	-2.5	-4.3	-0.5
Noakhali	-145,991	-123,385	-26,590	-3.8	-6.5	-1.4
Chittagong	134,841	111,589	21,928	2.5	3.8	0.9
Chitt. H. T.	69,178	42,488	16,764	11.9	13.4	6.4
Bandarban	19,173	14,128	5,211	11.2	15.0	6.7

[1]Less than 0.05.

Sources: Census Commission 1975.
Bangladesh Bureau of Statistics 1984.

also moved toward sparsely populated areas to settle. The net gains of the south-eastern region can be explained by this. The first and the third types of movement characterize the conservative, and the second types, the innovative migrations in the sense of Petersen's (1958) typology of migration.

The gender differential in net migration rates are also presented in Table 1. Fourteen out of 21 districts show higher male migratory movements. The net gaining districts received more males than females. Among the net losing districts, Rangpur, Mymensingh and Jamalpur experienced net gain of females over males, while all the net losing districts of the southern region lost more females than males. The considerable difference in male/female net migration rates was noticed in the districts with major cities and sparsely populated areas.

The age selectivity of net migration in Bangladesh during 1974-1981 is reflected in Table 2. The highest migratory movements took place in the youngest age group of 17-26 years. Among the net gaining districts, all but Bogra and Rajshahi show a distinct pattern of positive net migration in the age groups of 17-26, 27-36, and 37-46 years. Chittagong, Chittagong Hill Tracts, and Bandarban show positive net balance for all age groups. For the net losing districts of Pabna, Kushtia, Jessore, Faridpur, Tangail, Comilla and Noakhali, net loss was experienced in all groups except the oldest one (57-66 years), while Khulna, Patuakhali, and Jamalpur have net gain in age groups of 27-36, 37-46, and 47-56 years. An interesting pattern emerges from these findings. The districts lost more than gained in the younger age groups, most of them either experienced net gain or at least lost less in the older age groups, and vice versa. This pattern is distinctively clear for the age groups of 17-26 and 57-66 years, which indicates a characteristic feature of return migration to the place of origin.

The gender differential in age selectivity is presented in Tables 3 and 4. The results show that all south-eastern districts gained more males than females in all age groups. All the major city containing districts except Rajshahi gained more males than females in all age groups but the last one (57-66 years). Fourteen out of 21 districts experienced the opposite direction of movement between the youngest and the oldest age groups for males, whereas, this pattern is less clear for females. Although it appears that the three age groups (17-26, 27-36 and 37-46 years) seem to be dominant in

TABLE 2. CENSUS SURVIVAL ESTIMATES OF AGE-SPECIFIC NET MIGRATION RATES BY DISTRICTS, BANGLADESH 1974-1981

Districts	Age Groups				
	17-26 yrs.	17-36 yrs.	37-46 yrs.	47-56 yrs.	57-66 yrs.
Dinajpur	1.5	7.5	3.4	-6.4	-7.4
Rangpur	-3.9	1.0	-2.7	-8.0	-0.4
Bogra	-1.4	4.2	4.5	0.2	5.4
Rajshahi	-0.1	4.6	-1.2	8.2	11.6
Pabna	-4.1	-5.7	-7.8	-5.5	8.5
Kushtia	-1.5	-11.5	-10.9	-10.5	3.6
Jessore	-4.1	-8.5	-6.2	-6.3	5.4
Khulna	-2.4	1.5	5.3	0.8	-2.2
Patuakhali	-12.4	3.2	3.5	4.9	7.0
Barisal	-13.1	-4.3	1.7	-0.3	4.1
Faridpur	-14.0	-7.9	-4.6	-0.1	9.1
Dhaka	13.7	15.3	8.8	2.3	-1.6
Tangail	-5.8	-8.7	-7.0	-4.4	0.7
Mymensingh	-8.3	-2.2	0.7	1.8	6.2
Jamalpur	-10.6	0.3	2.2	0.6	4.4
Sylhet	-9.0	3.7	4.9	-3.8	-3.9
Comilla	-14.5	-8.7	-2.8	0.9	7.4
Noakhali	-17.7	-12.3	-5.2	-3.8	-7.0
Chittagong	7.6	5.0	3.9	8.2	4.4
Chitt. H. T.	27.3	28.5	22.9	18.8	8.1
Bandarban	22.9	31.4	28.2	20.0	6.2

Sources: Census Commission 1975.
Bangladesh Bureau of Statistics 1984.

TABLE 3. CENSUS SURVIVAL ESTIMATES OF AGE-SPECIFIC NET MIGRATION RATES FOR MALES BY DISTRICTS, BANGLADESH 1974-1981

Districts	Age Groups				
	17-26 yrs.	17-36 yrs.	37-46 yrs.	47-56 yrs.	57-66 yrs.
Dinajpur	3.7	6.2	4.5	-2.0	-5.7
Rangpur	-4.4	1.2	-3.7	-9.0	-4.9
Bogra	-0.2	5.4	4.0	2.5	2.0
Rajshahi	3.6	1.0	2.6	2.2	11.7
Pabna	-2.0	-4.8	-8.4	-8.5	0.5
Kushtia	2.5	-9.2	-9.2	-10.3	-3.5
Jessore	1.0	-6.0	-7.8	-6.0	-1.4
Khulna	3.4	3.7	8.3	2.8	-7.1
Patuakhali	13.7	2.1	2.6	5.8	10.3
Barisal	-9.3	-6.7	-0.4	2.5	5.2
Faridpur	-11.9	-13.2	-7.8	-3.6	5.5
Dhaka	21.4	21.3	12.8	3.6	-4.8
Tangail	-5.1	-12.0	-11.4	-7.4	6.4
Mymensingh	-7.9	-3.9	-1.0	1.4	2.3
Jamalpur	14.3	0.4	0.7	-0.3	-5.8
Sylhet	-5.7	0.0[1]	6.7	-0.7	-1.5
Comilla	-17.0	-18.8	-7.1	-3.2	3.6
Noakhali	-22.2	-27.0	-16.9	-9.1	3.4
Chittagong	17.4	7.7	4.6	4.5	41.3
Chitt. H. T.	26.1	34.1	25.6	33.3	10.3
Bandarban	30.0	38.0	33.2	34.8	1.7

[1]Less than 0.05.

Sources: Census Commission 1975.
Bangladesh Bureau of Statistics 1984.

TABLE 4. CENSUS SURVIVAL ESTIMATES OF AGE-SPECIFIC NET MIGRATION RATES FOR FEMALES BY DISTRICTS, BANGLADESH 1974-1981

Districts	Age Groups				
	17-26 yrs.	17-36 yrs.	37-46 yrs.	47-56 yrs.	57-66 yrs.
Dinajpur	5.8	7.4	1.8	-38.7	29.8
Rangpur	1.8	-0.0[1]	-3.7	-4.6	0.5
Bogra	3.7	1.6	3.7	-4.1	0.2
Rajshahi	1.5	-7.6	-4.3	11.0	2.8
Pabna	-0.0[1]	-8.2	-6.7	-3.4	10.0
Kushtia	0.3	-14.5	-12.0	-12.2	3.2
Jessore	-3.0	-11.7	-8.2	-5.2	4.1
Khulna	-1.0	-1.0	-24.9	1.3	-4.1
Patuakhali	-6.4	3.3	4.8	1.0	1.9
Barisal	-8.8	-1.2	1.8	-0.9	-2.8
Faridpur	-8.9	-3.4	0.2	4.6	9.5
Dhaka	12.9	7.7	2.9	-0.8	1.4
Tangail	0.2	-7.3	-4.2	-3.8	2.1
Mymensingh	-2.1	0.1	3.1	-0.8	5.0
Jamalpur	1.6	1.4	3.2	1.6	7.3
Sylhet	-5.8	7.1	4.2	-7.3	-9.3
Comilla	-5.4	0.0[1]	2.2	3.1	6.1
Noakhali	-8.3	-2.6	5.1	2.4	1.1
Chittagong	4.0	2.8	1.1	12.1	1.5
Chitt. H. T.	19.6	19.9	16.7	-5.5	-0.8
Bandarban	21.6	22.0	22.8	-10.2	11.8

[1]Less than 0.05.

Sources: Census Commission 1975.
Bangladesh Bureau of Statistics 1984.

migratory movements for both males and females, the other age groups also show considerable degrees of mobility. It is because (a) females migrate in the earlier age due to marriage, in the middle age to join their husbands, and in the late age to join the children's family either as dependents or as helping hands; and (b) males migrate in the earlier age in search of work, in the middle age due to changes either in occupation or work place, and in the older age to return home after retirement. The unclear pattern in the indication of return migration for females may be attributed to the fact that some male migrants might have left their wives or rest of the family permanently at the place of origin and visited them in the vacations or holidays. This is not unexpected in a traditional society like Bangladesh.

V. Trends Over Time

In order to see the changes over time in levels and patterns of internal migration in Bangladesh, Krishnan and Rowe's (1978) study can be used as a reference. Using the census data, they estimated net migration rates by districts for the periods of 1941-51, 1951-61, and 1961-1974. The estimated net migration rates from their study and from this study for the current census period are presented in Table 5. It should be noted that the rates between the intercensal periods are not comparable in the strictest sense of the term because of the creation of new districts from time to time. But if one looks at the broad regional level, the creation of new districts did not affect the patterns of the net migration rate, and therefore, the comparison seems quite reasonable.

During 1941-51, Rangpur had the highest rate in net gain, while Noakhali had the highest rate in net loss. Only six (Pabna, Faridpur, Dhaka, Mymensingh, Comilla and Noakhali) out of sixteen districts experienced negative net migration rate during this period. These districts lost people probably due in part to the exit of Hindus from the country after the Partition in 1947, and in part to their vulnerability through river erosions, cyclones and floods. In essence, the eastern and the central regions were net losers, while the southern and the northern regions were net gainers. Thus, the main migratory flows were toward the north and the southern regions. In spite of containing one of the major cities in the country, Dhaka district was unable to attract more people than it lost. This was

TABLE 5. CENSUS SURVIVAL ESTIMATES OF NET MIGRATION RATES BY DISTRICTS, BANGLADESH, 1941-1951, 1951-1961, 1961-1974 AND 1974-1981

Districts	Intercensal Periods			
	1941-1951[1]	1951-1961[1]	1961-1974[1]	1974-1981[2]
Dinajpur	1.6	6.0	9.8	1.0
Rangpur	3.1	4.7	2.9	-0.3
Bogra	0.1	1.9	1.1	1.6
Rajshahi	1.8	5.0	11.2	2.0
Pabna	-2.4	-0.6	3.1	-0.7
Kushtia	0.2	7.8	21.0	-1.7
Jessore	1.2	6.8	11.3	-1.4
Khulna	1.8	0.4	4.7	-0.0[3]
Patuakhali	--	--	-15.1	-0.7
Barisal	0.3[4]	-4.7[4]	-12.5	-2.4
Faridpur	-0.5	-3.4	-12.9	-2.7
Dhaka	-1.4	2.7	8.8	4.9
Tangail	--	--	-0.9	-2.0
Mymensingh	-0.5[5]	-0.7[5]	-3.8[6]	-0.7
Jamalpur	--	--	--	-0.3
Sylhet	1.9	-2.7	-4.2	-1.3
Comilla	-2.0	-6.0	-8.0	-2.5
Noakhali	-4.2	-18.6	-4.9	-3.8
Chittagong	1.4[7]	10.5[7]	4.0	2.5
Chitt. H. T.	--	--	8.5[8]	11.9
Bandarban	--	--	--	11.2

[1]From Krishnan and Rowe (1978).
[2]From Table 2 of this study.
[3]Less than 0.05.
[4]Includes Patuakhali.
[5]Includes Tangail and Jamalpur.
[6]Includes Jamalpur.
[7]Includes Chittagong Hill Tracts and Bandarban.
[8]Includes Bandarban.

probably because people did not feel pressured or find incentives to move to the urban areas.

During 1951-61, Dhaka became a net gainer, and Barisal and Sylhet became net losers. The net loss of Sylhet can be attributed largely to international migration (Krishnan and Rowe 1978:6). Pabna, Faridpur, Mymensingh, Comilla, and Noakhali continued to lose people. In addition to the old migratory flows, a new flow emerged toward the central region, i.e., toward the Dhaka city. Being the capital city, Dhaka became so attractive that it alone off-set the net loss of the whole region what was generated by the other districts of the region. In view of the emergence of this new flow, it was by then established that urbanward migration was gaining momentum.

During 1961-74, the whole northern region gained more than lost. Pabna joined the net gaining groups, while in the previous two periods, it experienced net loss. Three new districts were created in this period: Patuakhali out of Barisal, Tangail out of Mymensingh, and Chittagong Hill Tracts out of Chittagong district. All three new districts lost more people than gained, but these losses did not have any effect on the patterns of net migration in the country. Barisal, Faridpur, Mymensingh, Sylhet, Comilla, and Noakhali continued to lose more people than gain. The major patterns, as regards the flows, remained the same during this period.

The level of net migration rates for the 1974-81 period are lower as compared especially to the 1951-61 and 1961-74 periods.[1] During 1951-61, people might have moved more because after the partition of British India in 1947, a great amount of refugees/displaced persons entered the country (Kamaluddin 1985) who needed to be settled down for shelter, job, education, etc. During 1961-74, the high rates of net migration maybe the effect of the Liberation War of Bangladesh. After 1971, there were vaccua to be filled in (e.g., business, trade, commerce, industry and education) created by the cessation of Pakistani control and domination, and the outflow of non-Bengalis. Despite the low net migration rates, the 1974-81 intercensal period shows a significant change in the geographical patterns of internal movement of people what, with few exceptions, appeared to be almost

[1] It should be noted that net migration rates do not tell anything about the amounts and direction of the movements (i.e., in and out). The net rates in one period may be the result of higher amount of in-migration, or of out-migration or of both.

unchanging during the previous three intercensal periods. During 1974-81 period, the whole western region became a net losing area, where as Kushtia, Jessore and Khulna of this region were net gainers for the last thirty years. In the northern region, Pabna again became a net loser, and Rangpur for the first time, in last forty years, lost more than gained. Noakhali, Comilla, Sylhet, Mymensingh, Tangail, Faridpur, Barisal and Patuakhali continued to lose people. The main flows of migration were toward far north, centre, and south-eastern districts during this period, while for the last thirty years, they had been toward north and southern districts.

For gender differential and age selectivity, a complete analysis of trends over time cannot be attempted in view of the absence of estimates for all the intercensal periods. Krishnan and Rowe (1978) estimated net migration rates for males and females for the period of 1961-74, which shows that females seemed to migrate more than males (Table 6). This higher rate of female migration compared to that of the males is not consistent with the traditional behavioural pattern of the country. In Bangladesh, males are supposed to go out and earn bread for the family. The findings of this study support this pattern, which is opposite to that of Krishnan and Rowe's (1978) findings. The only region that shows higher female migration rate than male is the Khulna/southern region. Again this pattern is opposite to that of the Krishnan and Rowe's study. Although the age-specific net migration rates are not comparable due to the use of different age structures, the patterns found in their study for the period of 1951-1961 has remained the same for 1974-81 period of this study. For example, the highest migratory movement in the younger ages and the indication of return migration.

VI. Determinants of Internal Migration

According to the conceptual formulation of the problem earlier, it can be assumed that in an agrarian country like Bangladesh internal migration is determined by the exploitative unequal relations of people to the land along with the high population growth rate. On the basis of this assumption, two major hypotheses can be put forward to test: (i) the greater the extent of exploitative relations of people to the land in a district, the greater the extent of net loss of population; and (ii) the higher

TABLE 6. CENSUS SURVIVAL ESTIMATES OF NET MIGRATION RATES BY DISTRICTS, BANGLADESH, 1961-1974 AND 1974-1981

Districts	1961-1974 Period[1]		1974-1981 Period[2]	
	Male	Female	Male	Female
Dinajpur	7.2	12.5	1.2	1.0
Rangpur	1.9	3.8	-0.9	0.1
Bogra	0.4	1.4	1.9	1.1
Rajshahi	10.4	8.6	3.0	0.9
Pabna	3.5	2.7	-0.9	-0.3
Kushtia	19.3	22.9	-1.4	-2.1
Jessore	9.4	13.4	-1.0	-2.2
Khulna	3.7	5.7	0.8	-1.2
Patuakhali	-15.6	-14.2	-0.7	-0.8
Barisal	-12.5	-12.5	-2.2	-2.5
Faridpur	-12.6	-13.5	-3.5	-1.6
Dhaka	11.1	6.2	6.7	3.1
Tangail	-0.3	-1.5	-3.1	-1.0
Mymensingh	-5.0	-2.5	-3.0	0.1
Jamalpur	--	--	1.6	1.0
Sylhet	-4.8	-3.6	-1.2	-1.0
Comilla	-6.6	9.5	-4.3	-0.5
Noakhali	-3.5	-6.4	-6.5	-1.4
Chittagong	36.9	2.6	3.8	0.9
Chitt. H. T.	-12.3	4.0	13.4	6.4
Bandarban	--	--	15.0	6.7

[1]From Krishnan and Rowe (1978) p.13, Table 2.
[2]From Table 2 of this study.

the population growth rate in a district, the higher the extent of net loss of population.

But with the kind of data available at our disposal, it is possible to test them only indirectly. In the regression model, the activity rate in a given district has been considered as an indicator of the extent of exploitation. It is assumed that if the terms and conditions for the rental rate of land and the share of the produced crops are exorbitant, the activity rate will be low in a given district, and consequently, that district will experience a negative net migration. For the extent of population growth rate or the extent of population pressure on land, the population density per square mile of net cropped area is considered instead of the simple population density per square mile as an indicator. To make it more explanatory and meaningful, four more variables are included in the model. They are the urbanization rate, the literacy rate, the proportion of never married persons, and the average household size. The relevant data are presented in Table 7. The selection of these variables are based on the knowledge and feedback provided by the existing literature on the subject. It is hypothesized that any district with high literacy rate, high proportion of never married persons, and large household size likely to loose more people than gain; and any district with high urbanization rate likely to gain more than lose. Although some of the measures, e.g., literacy rate, are not adequate enough to explore the detailed effects on the net migration rate, it is hoped that the selected socioeconomic and demographic variables as determinants of net migration will reflect an indication of the actual situation of the country.

The results of the regression analysis are presented in Table 8. It shows that the regression model explains 93 per cent of the variance in the dependent variable. Among the explanatory variables, only activity rate and urbanization rate ($r = .272$, $p > .05$) are found to have statistically significant effects on net migration at .001 and .01 levels respectively. The relationships are in the expected direction in that the districts with high activity rate and high urbanization rate attract more people than lose. While the activity rate alone explains 81.5 per cent of the total variance in net migration rate, the urbanization rate explains 5.9 per cent. It is quite normal that people tend to move to areas where better occupational opportunities are available. Previous studies (e.g., Stoeckel et al.

TABLE 7. SELECTED SOCIO-ECONOMIC AND DEMOGRAPHIC CHARACTERISTICS OF THE DISTRICTS IN BANGLADESH, 1974

DISTRICTS	NMR	DSMNCA	AHHS	UR	AR	LR	PNMP[1]
Dinajpur	1.0	1324	5.3	4.4	30.5	21.5	31.2
Rangpur	-0.4	2169	5.6	4.8	29.0	16.2	29.7
Bogra	1.6	1920	5.4	3.7	27.9	22.1	29.3
Rajshahi	2.0	1609	5.7	5.8	27.4	19.4	31.2
Pabna	-0.6	1895	6.1	7.6	27.4	18.6	34.0
Kushtia	-1.7	1872	6.2	8.3	26.8	16.9	33.5
Jessore	-1.4	1730	6.1	5.4	26.0	22.5	34.1
Khulna	0.0[2]	2189	5.7	14.6	28.4	28.5	33.8
Patuakhali	-0.7	1380	5.2	2.5	27.7	27.7	30.0
Barisal	-2.4	2121	5.4	3.9	27.2	30.2	34.3
Faridpur	-2.7	2070	5.6	2.9	27.7	20.3	34.4
Dhaka	4.9	3697	5.8	29.6	30.4	26.3	36.3
Tangail	-2.0	2261	6.0	5.2	26.8	17.9	33.9
Mymensingh	-0.7	1983	5.4	6.0	29.6	13.6	31.7
Jamalpur	-0.3	1566[3]	5.6	4.6	29.6[1]	12.9	30.3
Sylhet	-1.3	1621	5.5	2.8	30.6	20.2	35.4
Comilla	-2.5	2742	5.7	4.2	28.5	23.8	33.6
Noakhali	-3.8	2185	5.5	2.2	26.2	26.2	34.8
Chittagong	2.5	3654	5.6	21.0	30.6	29.7	39.3
Chitt. H. T.	11.9	1828	5.3	9.8	44.0	17.6	34.1
Bandarban	11.2	66[3]	5.3	11.5	38.6[1]	9.2	33.6

NMR = Net Migration Rate
DSMNCA = Density per Square Mile of Net Cropped Area
AHHS = Average Household Size
UR = Urbanization Rate
AR = Activity Rate
LR = Literacy Rate
PNMP = Proportion of Never Married Persons
[1]Taken as proxy from Statistics 1984.
[2]Less than 0.05.
[3]Density per square mile area inatead of density per square mile of net cropped area.
Sources: Census Commission 1975.
Bangladesh Bureau of Statistics 1978.
Bangladesh Bureau of Statistics 1984.

TABLE 8. REGRESSION COEFFICIENTS WITH THEIR STANDARD ERRORS AND R-SQUARE CHANGE BY THE EXPLANATORY VARIABLES (N= 21 DISTRICTS)

Explanatory Variables	Dependent Variable (Intercept)	Unstd. Regn. coeffs. (a) (Std. Errors)	Std. Regn. coeffs. (B) (Std. Errors)	R-Square Change
AR	NMR (-14.20*)	.82*** (.098)	.84*** (.101)	.815
UR		.23** (.066)	.38** (.108)	.059
PNMP		-.34 (.168)	-.20 (.098)	.036
AHHS		.019 (.014)	.12 (.088)	.010
DSMNCA		-.0031 (.006)	-.066 (.131)	.008
LR		-.0047 (.073)	-.0066 (.102)	.000

R-square= .928
Adjusted R-square= .897

*** =P <.001
** =P <.01
* =P <.05
AR = Activity Rates
UR = Urbanization Rates
PNMP = Proportion of Never Married Persons
AHHS = Average Household Size
DSMNCA = Density per Squire Mile of Net Cropped Area
LR = Literacy Rates

1972; Chaudhury and Curlin 1975; Begum 1979) confirm this as the main reason for migration in Bangladesh. These studies indicate that the vast majority of migrants moved toward urban areas, and conclude rural to urban migration as the most dominant flow of migration. Skeldon (1985:44), however, argues by showing the 1974 census findings that rural to rural migration rate (47.2%) is still predominant in Bangladesh. He shows that when one combines both rural to urban (40.2%) and urban to urban (11.0%) migration rates, only then migratory movements toward urban areas are slightly higher than toward rural areas. It is true that the urban centres are recipients of a significant proportion of rural migrants, but the main concentration of these rural migrants occur in the major cities. The concentration of rural migrants in the major cities along with the migrants from other urban areas generate a new feature in the urban growth of the country. That is, the largest towns in the country that seem to be growing the fastest (United Nations 1981:25-27; Chaudhury 1980:23-25), while the small towns are probably dying through losing more population than gaining. The 1981 census reveals that the number of towns containing less than 25000 people has decreased to 19 in 1981 from 65 in 1974. This maybe due partly to the change in definition of urban areas or reclassification of areas as urban and rural, and partly to the fact that small towns are failing to provide incentives in terms of job, business, etc.

According to the second major research hypothesis, it was expected that highly densely populated areas tend to lose more people than gain. Studies by Haque (1977), Krishnan and Rowe (1978), and Elahi and Sultana (1985) find the expected result. But the result of the regression analysis of this study does not support this. This is evident from Table 7 that many districts with high density gained more than lost, while others with low density lost more than gained. The high explanatory power of activity rate and the insignificant effect of population density suggest that population pressure is not a primary determinant of migration in Bangladesh. Rather that the unequal and exploitative agrarian relations arising out of the disparity in rights and privileges between the landowners and the actual cultivators of the soil are the elements of the web of the basic structural context that generates the rates and directions of net migration. In other words, the majority of the migratory movements in Bangladesh was determined by the forces in social relations of production

through the interaction between man and man. The review of the historical evolution of land relations of the country and the findings of the regression analysis lead to a conclusion in that direction. However, further study is needed to cinfirm the contention directly through a special survey involving information on credit relations, land concentration, landlessness and migratory movements.

The influence of the other determinants, such as, the literacy rate, the proportion of never married persons and the average household size are not clear, as they fail to achieve statistical significance.[9] It is universally considered that the higher the educational level of people in an area, it is more likely that people are aware of differential opportunities and amenities in alternate places, and the more likely they migrate. Chaudhury (1978) finds that the overall educational level of migrants is higher than that of the nonmigrants, and the propensity to migrate increases with the increase in education beyond secondary level. The 1981 census shows that slightly over three per cent of the total population of the country has education beyond secondary school certificate level (Bangladesh Bureau of Statistics 1984:93). Although it is beyond the scope of this study due to the unavailability of districtwise data on level of schooling, it can certainly be assumed that this highly selected group has greater aspiration to better itself, and tend to move more than the less educated group. But when it comes to the total net migrants of each district, this high selection does not dominate any more. Most of the migrants seem to be unskilled manual labourers, landless agricultural labourers, petty business men and housewives (Stoeckel et al. 1972; Chaudhury and Curlin 1975; Chaudhury 1978; Begum 1979). Therefore, it can be stated that migration takes place in Bangladesh regardless of educational level.

The never married persons are always in advantageous position to migrate, because they are young, and have less family ties. Therefore, it is expected that the districts with greater proportion of never married persons tend to lose more people than gain. But it should be noted that this is true for the males, while for the females, the opposite is the state of affair. Females move out generally as

[9] It should be noted that the lack of statistical significance does not always mean that these variables are not important in the determination of migration. The lack of statistical significance may arise from many factors, such as, homogeneity of the population and problems in the data set.

housewives and dependents (Stoeckel et al. 1972; Chaudhury and Curlin 1975). The proportion of never married persons as an indicator of marital status fails to achieve statistical significance, and explains only 3.6 per cent of the total variance in the dependent variable. The use of the figures for the proportion of never married persons from the 1981 data source as proxy for the 1974 situation may have a bearing on this. In addition, the proportion of never married persons is relatively low and not widely varied among the districts because of the prevalence of universal and early marriage in Bangladesh.

The reason for the statistically non-significant effect of the average household size is obvious. The average household size of the districts have not varied very much, even though they are comparatively high in all districts. Stoeckel et al. (1972), and Chaudhury and Curlin (1975) have found that in Bangladesh out migration is higher among the smaller and the larger sized households. They suggest that the high rate among the small sized maybe due to the presence of unrelated or single individuals who generally represent the most mobile segment of the population. The high rate among the large sized households may result either from the pressure exerted by the families themselves for supporting adequately all its members, or from the better socioeconomic position of the larger families. Studies by Asaduzzaman (1973) and Chaudhury (1981) have shown that larger families are positively associated with larger landholding sizes. It can be argued that the members of the rich and large families may not need to move, because they can provide adequate support for themselves. On the other hand, they are the prime candidates to make a move for the betterment of their rank in the socioeconomic status.

Two other models have been developed to examine the differential effects of the explanatory variables on male/female net migration rates. The results, in terms of the statistical significance, do not show any difference than the one discussed above. The same two variables (activity rate and urbanization rate) have effects on both male and female net migration rates. The differences in the magnitude of the effects of the other explanatory variables, which indicate their relative importance, are noticed, but they are not substantial enough.

VII. Summary and Conclusions

The traditional agrarian social structure of Bangladesh reflects an unequal hierarchical relations of people to the land which is rooted in the historical evolution of the land system of the region. The land system evolved such a way that the distribution of rights and privileges in land went always in favour of the landowners with large holdings. These secured and superior rights and privileges have enhanced their bargaining power to push the rental rate high driving the share of the labourers below the subsistence level. The insecure position of the cultivating peasants in the land hierarchy induces them to generate surplus population for survival. But this generation of surplus population has aggravated the condition of the sharecroppers, small farmers and landless labourers to the point that they compete among themselves to obtain access to the limited amount of land. The pressure emanating from the land relations conditions the process in which people are forced to move sectorally and then spatially to areas where the pressure is less and work available.

Within the confine of the historical and social background of the country, an attempt was made to study the patterns, trends, and determinants of internal migration in the country. The census reports of 1974 and 1981 were used as data sources. In the absence of direct data, census survival ratio method was used to estimate the net migration rate for 21 districts of Bangladesh. A multiple regression model was devised to see the effects of selected socioeconomic and demographic explanatory factors on migration.

The analysis of the data reveals that the overall level of net migration rates appeared to be comparatively low during 1974-1981 than in the previous periods in most of the districts of Bangladesh. Seven out of 21 districts gained more people than lost. Three of them were from the northern, three from the eastern, and only one from the central region. This indicates that people moved toward rural areas of the northern and sparsely populated areas of the south-eastern region, where the exploitative pressure from land relations seemed to be less. These movements characterize the conservative type of migratory movements. People also moved toward major urban areas, which characterize the innovative type of movements.

While the migratory flows were toward the north and the southern districts for more than thirty years (between 1941 and 1974), during 1974-1981, the flows were toward the north, the central, and the south-eastern districts. Sixteen out of 21 districts showed higher male migratory movements than female during 1974-1981. All districts in the southern region experienced a higher female migration rate than male. During 1961-1974, the opposite pattern was found. The highest migratory movements took place among the younger people. An indication of return migration is noted. No conclusive gender differential was found in terms of age selectivity. Although somewhat speculative, this study points to two additional observations: that rural to rural migration is still predominant in Bangladesh; and that the small towns are dying through loosing more people than gaining. This is to say that small towns probably are not serving as primary stepping stones for big city migration.

The statistical findings of the regression analysis fail to support that high population growth/density determines the migratory flows in the country by putting excessive pressure on limited amount of land available for agricultural production. On the contrary, the activity rate as an indicator of the extent of exploitation accounts for 81.5 of 93 per cent of the explained variance in the dependent variable. This suggests that population density may put pressure on land in a traditional agrarian society, where the industrial, service, and tertiary sectors are not developed enough to absorb the surplus labour force, but the interacting forces of the unequal hierarchical land relations play a major role in determining the spatial movement of the population. That is, the exploitative agrarian relations of production through the interaction between man and man seem to play significant role in the determination of most of the migratory movements in Bangladesh.

However, in view of the nature of the data set used in the study, the findings should be interpreted with caution. For a direct conclusion, as well as to comprehend the whole dynamics of internal migration in Bangladesh, a more rigorous study through a special survey is necessary involving information on credit relations, land concentration, landlessness and migratory movements. In conclusion, it can be said that this study has indicated a tentative support to the overall argument posed to understand the patterns, the trends, and the determinants of net migration in Bangladesh.

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